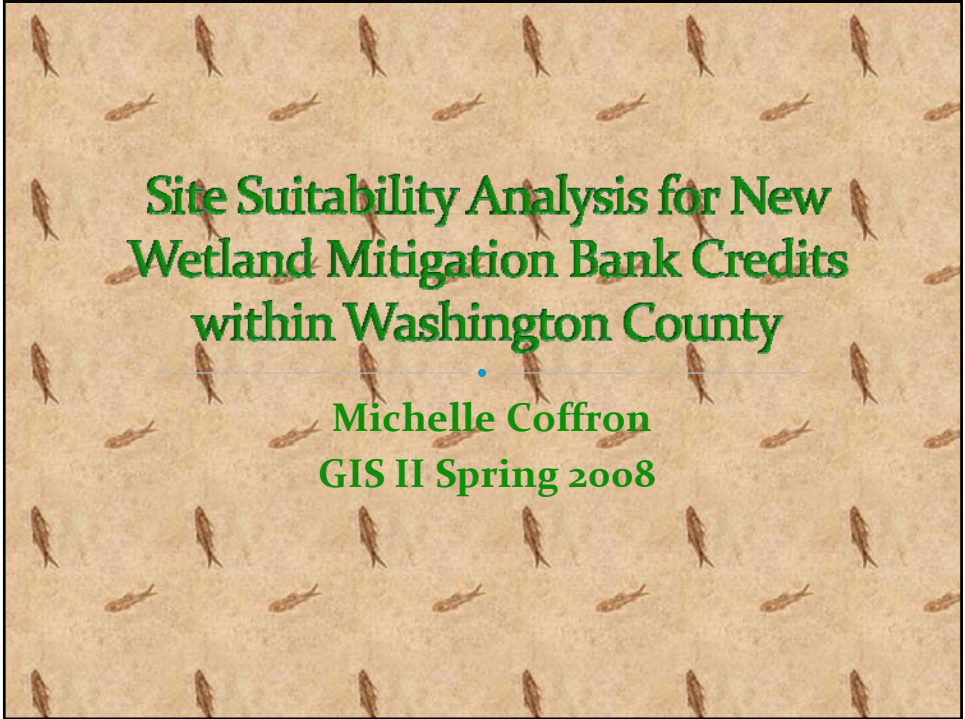
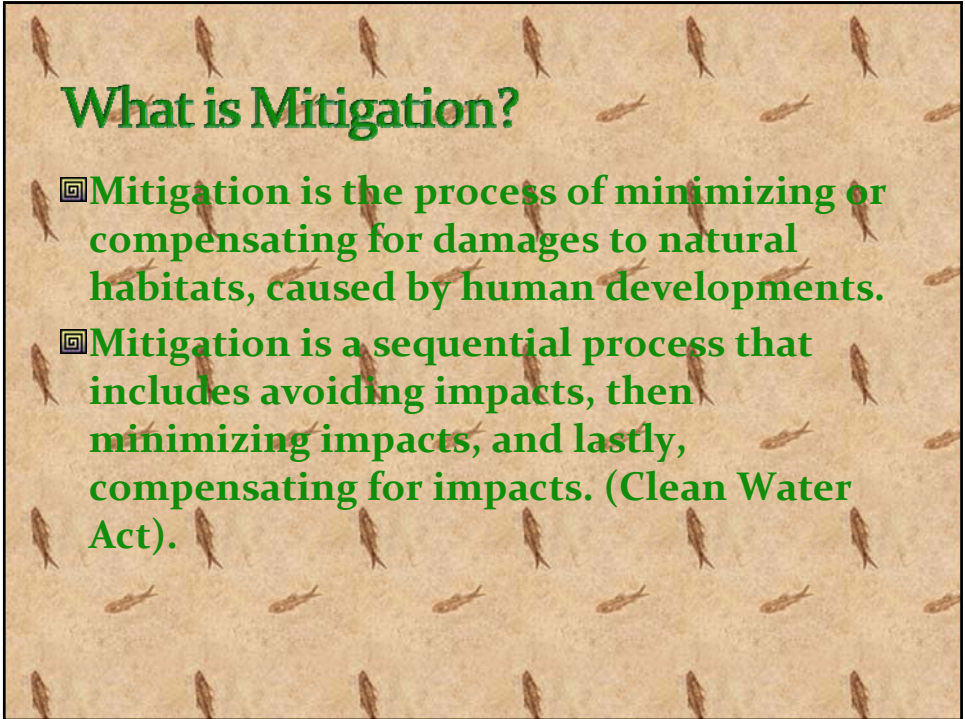




Site Suitability Analysis for New Wetland Mitigation Bank Credits within Washington County

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What is Mitigation?

- ▣ Mitigation is the process of minimizing or compensating for damages to natural habitats, caused by human developments.
- ▣ Mitigation is a sequential process that includes avoiding impacts, then minimizing impacts, and lastly, compensating for impacts. (Clean Water Act).

What are Wetland Mitigation Banks?

- ▣ Wetland mitigation banks are large areas of wetland that are federally protected to offset impacts which occur to other wetlands within a watershed.
- ▣ Impacts are typically from agriculture, urban growth, and development.

Why Protect Wetlands?

- ▣ Wetlands are natural water filters that absorb toxins, provide habitat, and minimize impacts from harsh storms like hurricanes.
- ▣ State and federal laws protect wetlands and require that mitigation is completed when they are going to be filled or removed. (ACOE)

Wetland Regulations

- ▣ State and federal government is promoting the development of wetland mitigation banks to provide mitigation options to wetland fill/removal permit applicants (developers).
- ▣ Permit is required for any new development in wetland areas.

Wetland Regulations

- ▣ If one acre of wetland is impacted, one to three acres of wetland must be restored either onsite or in a different location.
- ▣ A wetland mitigation bank provides an option for developers because they can purchase wetland credits as mitigation for their impacts.
- ▣ A wetland credit is equivalent to one acre of wetland impacted.

Problem Statement

▣ Find suitable sites for potential wetland mitigation bank credits within Washington County.

▣ Two sets of factors:

- ◆ Capability factors
- ◆ Suitability factors

Is the Site Capable of Supporting a Wetland?

▣ Ideal land is land that already has functioning wetlands or areas that have been classified as historic.

▣ Wetlands need minimal topography to function properly and relatively flat land is preferred.

Is the Site Capable of Supporting a Wetland?

Layers:

- ◆ Hydric soils
- ◆ National Wetlands Inventory
- ◆ Streams and rivers
- ◆ Slope
- ◆ Floodplains

Is the Site Suitable for Supporting a Wetland?

- ◆ Ideal site would be just outside of Metro's Urban Growth Boundary (UGB) but still within Washington County.
- ◆ Other factors include parcelization, availability, ownership, and zoning or land use.

Is the Site Suitable for Supporting a Wetland?

Layers:

- ◆ Zoning
- ◆ County boundaries
- ◆ Metro's UGB
- ◆ Taxlots
- ◆ Vacant

Final Considerations

Layers:

- ◆ Vegetation (type)
- ◆ Land cover 1998 (land cover type)
- ◆ Resource (agriculture/forest use only)
- ◆ City boundaries (location)
- ◆ Wash_na (taxlot street names)
- ◆ Ownership? (owner id)

Site Criteria:

Layers and Attributes:

- ◆ Hydric soils (soil type)
- ◆ National Wetlands Inventory (NWI wetland type)
- ◆ Streams and rivers (location)
- ◆ Slope (%)
- ◆ Floodplains (Fema 100 year and 1996 metro flood)
- ◆ Zoning (land use)
- ◆ County boundaries (location)
- ◆ Metro's UGB (location)
- ◆ Taxlots (parcel id)
- ◆ Vacant (parcel id)
- ◆ Vegetation (type)
- ◆ Land cover 1998 (land cover type)
- ◆ Resource (agriculture/forest use only)
- ◆ City boundaries (location)
- ◆ Wash_na (taxlot street names)
- ◆ Ownership? (owner id)

Site Criteria

Site must be:

- ◆ classified with soils that are hydric.
(hydric_soils)
- ◆ classified as a wetland or a historic one. (NWI)
- ◆ within Washington County, Oregon. (cty_line)
- ◆ at least 50-100 acres (taxlots)
- ◆ in an area that does not have steep slopes.
- ◆ outside of Metro's urban growth boundary.
(ugb_line)

Other Things to Consider:

- ◆ Taxlots
- ◆ Zoning?
- ◆ Vegetation?
- ◆ Land cover 1998
- ◆ Resource
- ◆ City boundaries
- ◆ Wash_na
- ◆ Ownership?

Other Things to Consider

▣ Site could or should be:

- ◆ near or intersecting a stream or river.
- ◆ near, intersecting, or within a floodplain (100yr-Fema or Metro 96)
- ◆ vacant.
- ◆ zoned agricultural or resource. (land use)
- ◆ supporting wetland or transitional vegetation.
- ◆ outside of the ugb but still within WA County.

Overlay will consider:

- ◆ city boundaries as to show reference to where the new mitigation bank site will be located.
- ◆ taxlot street names found in the wash_na layer on top of the available taxlot layer.
- ◆ who owns the available taxlots.